

### **REMARKS**

Claims 17-31 are pending in the above-identified application upon entry of the present amendments. Claims 1-16 and 32-36 were previously canceled. Claims 17 and 19 have been amended in the present response and Claims 18 and 20-31 have been previously presented. No new matter has been added by way of the present amendments.

Support for the amendments made to Claims 17 and 19 is found throughout the instant Application. Support for the amendments to both Claim 17 and Claim 19 is found on page 19, lines 26-28 and on page 21, lines 10-13 and 16-30.

#### **I. Rejection of Claims 17-22, 24, 26, 27, 29 and 30 Under 35 U.S.C. § 102(f) and (g)**

Claims 17-22, 24, 26, 27, 29 and 30 are rejected under 35 U.S.C. 102 (f) and (g) as being allegedly anticipated by Sorge et al (U.S. Patent 5,556,772). However, as detailed below, Sorge et al does not disclose all of the elements of the present invention and therefore, the rejection should be withdrawn.

The Office states that Sorge teaches a kit for the synthesis of a polynucleotide, the kit comprising a first DNA polymerase and a second DNA polymerase, wherein the ratio of the *exo-* polymerase to the *exo+* polymerase is greater than 1 to 1. The Office indicates that Table 7 of the Sorge 5,556,772 reference, illustrates that Sorge teaches a ratio of the *exo-* polymerase to the *exo+* polymerase as being greater than 1 to 1. However, Table 7 of the Sorge reference, refers only to ratios of the *exo-* polymerase to the *exo+* polymerase in ratios up to 9:1, and no higher. Nowhere in the reference does Sorge recite polymerase ratios greater than 9:1. The Applicants respectfully point out that Sorge actually teaches away from using various ratios of DNA polymerases (see page 14, lines 49 to 54 of Sorge US 5,556,772). In that passage, it is stated: "Template concentration can affect the amplification efficiency and may explain

**there is little difference in the amount of PCR product in the different samples when the ratio of DNA polymerases is varied. “**

In the present response, claims 17 and 19, and those claims that depend from claims 17 and 19, have been amended to specify polymerase ratios from about 1:100 to about 1:600.

For a valid 102(f) and 102(g) reference, the reference must recite the same invention as the instant Application. The Sorge reference lacks support for ratios greater than 9:1, and because polymerase ratios from about 1:100 to about 1:600 are found in the present Application, the inventions are not the same. Support for ratios of the *exo-* polymerase to the *exo+* polymerase greater than 10:1 can be found in the present Application as well as the parent application from which priority is claimed (as detailed in the preceding paragraphs).

Accordingly, because the invention of the instant application, as currently amended, is not the same invention as that found in the Sorge reference, a proper 102(f) and 102(g) rejection cannot be made using this reference. The Applicant therefore respectfully requests that the rejection of Claims 17-22, 24, 26, 27, 29 and 30 under 35 U.S.C. § 102(f) and (g) be withdrawn.

## **II. Provisional Rejection of Claims 17-31 on grounds of Nonstatutory Obviousness-type Double Patenting.**

Claims 17-31 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-33 of co-pending Application No. 08/483,535. As acknowledged by the Office, the alleged conflicting claims have not been allowed. Applicants, therefore, will address the merits of the obviousness-type double patenting rejection when or if co-pending Application No. 08/483,535 is allowed.

**CONCLUSION**

For the foregoing reasons, Applicant respectfully requests reconsideration and withdrawal of rejections of the claims. It is believed that the claims as currently presented are in a condition for allowance and such favorable action is respectfully requested. If any questions arise or if any issues remain to be resolved, it is requested that the Examiner contact the undersigned attorney.

Respectfully submitted,

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